CALIFORNIA ENERGY COMMISSION
1516 NINTH STREET
SACRAMENTO, CA 95814-5512

March 5, 2001

Ronald Cabe
Senior Director, Project Development
Dynegy Marketing and Trade
1000 Louisiana Street
Houston, Texas 77002

Dear Mr. Cabe

**EL SEGUNDO POWER REDEVELOPMENT PROJECT**
**1st ROUND DATA REQUESTS**

Pursuant to Title 20, California Code of Regulations, section 1716, the California Energy Commission staff requests the information specified in the enclosed data requests. The information requested is necessary to: 1) more fully understand the project, 2) assess whether the facility will be constructed and operated in compliance with applicable regulations, 3) assess whether the project will result in significant environmental impacts, 4) assess whether the facilities will be constructed and operated in a safe, efficient and reliable manner, and 5) assess potential mitigation measures.

This set of data requests (#1-85) is being made in the areas of air quality, biological resources, cultural resources, geology, land use, noise traffic and transportation and requests from the California Coastal Commission and city of El Segundo. Written responses to the enclosed data requests are due to the Energy Commission staff on or before April 5, 2001, or at such later date as may be mutually agreed.

If you are unable to provide the information requested, need additional time, or object to providing the requested information, you must send a written notice to both Commissioner Robert Pernell, Presiding Committee Member for the Nueva Azalea Power Plant Project proceeding, and to me, within 15 days of receipt of this notice. The notification must contain the reasons for not providing the information, the need for additional time and the grounds for any objections (see Title 20, California Code of Regulations section 1716 (e)).

If you have any questions, please call me at (916) 653-1245, or E-mail me at jreede@energy.state.ca.us.

Sincerely,

James W. Reede, Jr.
Energy Facility Siting Project Manager

Enclosure
cc: POS

**El Segundo Power Redevelopment**
**Data Requests**
**(00-AFC-14)**

**Technical Area: Air Quality**
**Author**: Joseph M. Loyer

## BACKGROUND

The identification and approval of appropriate emissions offsets is frequently a cause of project delays. The applicant identifies several sources of offsets for the air quality impacts associated with the project emissions (AFC page 5.2-70 to -77). In this section of the AFC, the applicant identifies the need for further ERCs to be developed or negotiated and the need to develop interpollutant offset trading ratios for NOx, SOx and VOC for PM10. Staff encourages the Applicant to expedite the process of identifying and securing sufficient verifiable emission offsets. Staff also encourages the applicant to seek combustion PM10 ERCs originating in the same area as the project PM10 emission impacts to mitigate any potential environmental justice impacts from the proposed project PM10 emissions.

## DATA REQUEST

1. Please provide documentation of all proposed offsets. This documentation may be any one of the following:

- A Letter of Intent,
- An Options Contract, or
- An actual certificate.

2. Please provide full and detailed documentation of any proposed mitigation measures the applicant is pursuing to offset the potential project impacts.
3. Please provide full documentation for any interpollutant-trading ratio developed in conjunction with the South Coast Air Quality Management District.
4. Please identify all viable combustion based PM10 ERCs available which originate in the same vicinity as the proposed project PM10 impacts.

## BACKGROUND

The applicant did not include the contribution of ammonia slip to the formation of secondary PM10. Ammonia slip can contribute to the formation of secondary PM10 by reacting with NOx and SOx to form nitrates and sulfates. This reaction can contribute to existing violations of the PM10 ambient air quality standards.

## DATA REQUEST

5. Please evaluate the contribution of ammonia slip emissions from the proposed power plant on the formation of secondary PM10.

**El Segundo Power Redevelopment**
**Data Requests**
**(00-AFC-14)**

**Technical Area: Biological Resources**
**Author**: Noel Davis

**BACKGROUND**

In the Application for Certification, the applicant has provided an assessment of the biological impacts due to entrainment and impingement at the cooling water intakes. However, the analysis of entrainment impacts was based on studies done in 1981 at the Scattergood Generating Station. CEC staff is concerned that studies done over 20 years ago may no longer be valid. The Application for Certification provides recent information on ichthyoplankton from King Harbor in Redondo Beach and states that validating studies have just been completed to determine whether the King Harbor ichthyoplankton assemblage is representative of ichthyoplankton near the El Segundo Generating Station intakes. However, these recent plankton data are not used in the impact assessment.

**DATA REQUESTS**

6. Please provide an assessment of the impacts of entrainment and impingement on nearshore fish and invertebrate populations using the recent plankton data as well as recent information on impingement and the size of fish populations in Santa Monica Bay.

**BACKGROUND**

CEC staff is concerned that several species of commercial and sportfishing importance may be affected by operations of the El Segundo Generating Station. These species include white seabass (*Atractoscion nobilis*), black seabass (*Stereolepis gigas*), California halibut (*Paralichthys californicus*), spiny lobster (*Panulirus interruptus*), and bocaccio (*Sebastes paucispinus*)(petitioned for listing under the federal Endangered Species Act). Even though impingement and entrainment of these species may be low, the populations of these species in Santa Monica Bay may also be low or declining.

**DATA REQUESTS**

7. Please provide an analysis of the impacts of impingement and entrainment by the El Segundo Generating Station cooling water intake on the populations of white seabass (*Atractoscion nobilis*), black seabass (*Stereolepis gigas*), California halibut (*Paralichthys californicus*), spiny lobster (*Panulirus interruptus*), and bocaccio (*Sebastes paucispinus*). Please base this analysis on recent data and consider that the impacts of the El Segundo Generating Station is in addition to whatever fishing pressure there may currently be on each population.

**BACKGROUND**

CEC staff is concerned that populations of fishes and invertebrates in Santa Monica Bay are being impacted by at least three cooling water intake systems, the El Segundo Generating Station, the Scattergood Generating Station, and the Redondo Generating Station. The cumulative impacts analysis in the Application for Certification merely states that the proposed El Segundo Generating Station Power Redevelopment Project will not increase impacts therefore cumulative impacts are negligible. The conclusion of minimal cumulative impact is based on the fact that significant adverse effects from power plant cooling water intakes have not been demonstrated in California. However, CEC staff is not aware that an analysis has been done to specifically determine potential cumulative impacts of power plant cooling water systems on the marine resources of Santa Monica Bay.

**DATA REQUEST**

8. Please analyze the cumulative impact on the marine resources of Santa Monica Bay of the cooling water intakes of three power plants, the El Segundo Generating Station, the Scattergood Generating Station and the Redondo Generating Station, operating simultaneously. Please consider that these impacts are in addition to the fishing pressure on certain species. Please specifically address the cumulative impacts to white seabass (*Atractoscion nobilis*), black seabass (*Stereolepis gigas*), California halibut (*Paralichthys californicus*), spiny lobster (*Panulirus interruptus*), and bocaccio (*Sebastes paucispinus*).

**BACKGROUND**

Attachment 7 in the Application for Certification makes the argument that the intake system of the Scattergood Generating Station, which is similar to the intake of the El Segundo Generating Station, is the best technology available because impacts to aquatic resources are not great. However, since the design and subsequent modification of the intake by the velocity cap, additional technologies may have become available that would further reduce impacts to marine resources.

**DATA REQUEST**

9. Please discuss whether there may be technologies available and feasible that would reduce the impacts of the cooling water intake on marine resources.

**BACKGROUND**

The Application for Certification states that impingement deaths are related to heat treatments done to clear the cooling water system of fouling organisms. CEC staff is concerned that heat treatment may have a greater impact on biological resources than alternative methods to remove fouling organisms.

**DATA REQUESTS**

**10.** Please provide justification that heat treatment is the least environmentally damaging practical alternative for the control of fouling organisms in the cooling water system.

**El Segundo Power Redevelopment**
**Data Requests**
**(00-AFC-14)**

**Technical Area: Cultural Resources**
**Author**: Jeanette A. McKenna and Dorothy Torres

**BACKGROUND**

A discussion of the Kramer Staging Area on page J-24 discusses the proposed staging area that is covered with asphalt over slag and debris from the former H. Kramer Company foundry. The discussion in the site record also addresses the asphalt covered slag heap as part of the site. It appears from the discussion in both references that this portion of the H. Kramer Company foundry site is within the project APE.

**DATA REQUEST**

11. Please explain why this area was not included as part of the site in the map identifying the site record. Please correct the site record map or explain why it is correct.

12. It appears that the Kramer Staging Area will sit on an asphalt covered portion of the former H. Kramer Company foundry. Please discuss potential impacts to the site as a result of staging area location.

**BACKGROUND**

The AFC identifies responses from several Native Americans who expressed concern about a potential for sites in the project area.

**DATA REQUEST**

13. Have there been any additional responses to the information letters sent to Native Americans by the applicant? Please provide copies of any responses that were sent in writing and summaries of responses that were by telephone.

**BACKGROUND**

Appendix K, page 2 and several other sections of the AFC discuss the area of proposed alternate waterlines.

**DATA REQUEST**

14. Has there been a decision concerning the proposed alternate water line route? If an alternate route has been selected, please describe it and identify the route on a map at a scale comparable to Figure 3.2-2 in the AFC.

**BACKGROUND**

Appendix K provides a list of properties in the vicinity of the proposed and alternate water line route.

**DATA REQUEST**

15. Please provide site records (Form DPR 523) for all properties judged to be of either medium or high potential for eligibility to the national register.

**BACKGROUND**

Appendix K identifies several areas that might be used for laydown or parking that do not appear to be under consideration in the cultural confidential appendix and other parts of the AFC.

**DATA REQUEST**

16. Please list all areas that may be used as parking and/or construction staging areas.

**BACKGROUND**

Staff needs to identify all areas of potential ground disturbance.

**DATA REQUEST**

17. Please describe the locations of any access roads or additional ground disturbance and add these locations to Figure J-2 provided in the confidential cultural appendix.

**BACKGROUND**

Page 3.7-1 of the AFC indicates that the reclaimed water line and the potable water line will be enclosed in the same trench.

**DATA REQUEST**

18. What is the anticipated depth and width of the trench in feet?

**El Segundo Power Redevelopment**
**Data Requests**
**(00-AFC-14)**

**Technical Area: Efficiency**
**Author**: Steve Baker

## BACKGROUND

Section 5.19.7 of the AFC addresses off-design efficiency of the power plant, and refers to Figure 5.19-1.

## DATA REQUEST

19. Figure 5.19-1 was missing from the AFC. Please provide it.

**El Segundo Power Redevelopment**
**Data Requests**
**(00-AFC-14)**

**Technical Area: Geology and Paleontology**
**Author**: Robert Anderson

## BACKGROUND

The project area is in the region that was affected by strong ground shaking from the March 10, 1933 Long Beach earthquake. Areas of liquefied soils were reported in the region after the earthquake. Page G-9 of the AFC indicates that the site area is not known to have experienced liquefaction during historic earthquakes. However, no information regarding liquefaction reported in the region after the Long Beach earthquake is mentioned.

## DATA REQUEST

20. Please identify if liquefaction was reported along the existing and proposed linear facilities and the project site after the 1933 Long Beach earthquake.

## BACKGROUND

The Southern California Earthquake Center (SCEC) recently released a report entitled "Accounting for Site Effects in Probabilistic Seismic Hazards Analyses of Southern California" (The SCEC Phase III Report) which is published in the *Bulletin of the Seismological Society of America*, volume 90, No. 6B, (December 2000).

## DATA REQUEST

21. Please indicate if the material presented in the SCEC Phase III report will have an effect on the estimated strong ground motion determined for the project and the linear facilities.

22. If the material presented in the SCEC Phase III Report causes the ground motion to change, please provide a brief explanation how the material from the SCEC Phase III Report affected the initial strong ground motion determination.

## BACKGROUND

Pages G-10 and G-11 of the AFC indicates that artificial fill will replace the upper five to twenty feet of soil at the project site.

## DATA REQUEST

23. Please highlight the cut and fill areas on the grading and drainage plans. If the excavation is to extend below the ground water table, please indicate how excavation and fill placement below the ground water table would be accomplished.

## BACKGROUND

The location of oil wells and former sand and gravel works is not clearly identified on AFC figure 5.3-2.

## DATA REQUEST

24. Please highlight the location of oil and gas wells and sand and gravel works on figure 5.3-2 of the AFC. If no oil or gas wells or sand and gravel works show up on the figure then clearly state so on the figure.

## BACKGROUND

The beach sand near the southwestern boundary of the site appears to have washed away so that the width of the beach is less than the width of the beach near the northwestern corner of the site. This may be due to interference in sand movement along the coast by the rock groin northwest of the site.

## DATA REQUEST

25. Please identify the parties responsible for maintaining the beach and submit a copy of their erosion control plan for the beach south of the rock groin.

Note: There are no data requests for paleontological resources or surface water hydrology at this time.

**El Segundo Power Redevelopment**
**Data Requests**
**(00-AFC-14)**

**Technical Area: Land Use**
**Author:** Mark R. Hamblin

## BACKGROUND

The AFC (AFC, page 3.2-1, third paragraph, page 5.9-2, fourth full paragraph) does not explain nor show the land division procedure that was used (e.g. parcel map, etc.) to divide the original 36 acre Southern California Edison (SCE) property to create 3 parcels consisting of 24.7 acres (currently owned by El Segundo Power LLC); 2.24 acres (the existing SCE switchyard); and 9 acres (the existing SCE fuel oil tank farm). The State Subdivision Map Act (*California Government Code Sections 66410-66499*) provides the State requirements and procedures for conducting a land division for the purpose of sale, lease or finance.

## DATA REQUEST

26. Explain the land division procedure used to divide the former 36 acre SCE power generation property to create the current three parcels.

27. Show on a map (parcel map, lot line adjustment map, etc.) the 3 legally created parcels that comprises the former 36 acre SCE power generation property.

**El Segundo Power Redevelopment**
**Data Requests**
**(00-AFC-14)**

**Technical Area: Noise**
**Author**: Jim Buntin

**BACKGROUND**

The CEC typically assesses compliance with the 5 dB noise level increase criterion by comparison of the steady state noise level due to the power plant to the average (or typical) $L_{90}$ values obtained during nighttime hours, as noted by the applicant. The Cities of El Segundo and Manhattan Beach apply a similar criterion to the median ($L_{50}$) ambient noise level. The applicant has summarized the average hourly $L_{90}$ and $L_{50}$ values collected in the long-term noise measurement periods in Table 5.12-1, and in the text of the AFC. However, the hourly noise level data were not provided.

**DATA REQUEST**

28. Please provide the hourly $L_{eq}$, $L_{50}$, and $L_{90}$ values for noise measurement sites LT-1, LT-2, LT-1a, LT-2a, LT-3 and LT-3a in tabular format. Note the time periods where extraneous noise sources affected the noise level data.

**El Segundo Power Redevelopment**
**Data Requests**
**(00-AFC-14)**

**Technical Area: Traffic and Transportation**
**Author:** James Fore & Lance Pagel

**BACKGROUND**

There is a potential for visibility impairment due to vapor plumes produced by the project reaching ground level on adjacent roadways. This may affect traffic safety on the local roadways in the vicinity of the project site.

**DATA REQUEST**

29. Please provide an analysis of the traffic safety impacts resulting from the expected plumes from the project on adjacent roadways.

**BACKGROUND**

The AFC states that shipments of hazardous material will occur during construction and once the plant is in operation. The AFC indicates that the use of trucks is required for hazardous materials transport.

**DATA REQUEST**

30. Please indicate what truck routes may be used for the delivery of hazardous material and identity any railroad crossing, sharp curves, schools, hospital, etc. along these routes.

**BACKGROUND**

The pipeline construction activities and associated lane closures will impact local traffic flow during construction.

**DATA REQUEST**

31. Please identify the Level of Serve (LOS) for those sections of the roadways impacted and the mitigation measures such as signage, detours, and flagman if required, etc. that will be taken to minimize the impact of construction.

32. Please identify the impact that pipeline construction may have on local business and on street parking and mitigation measures planned to minimize the impact.

**BACKGROUND**

The AFC indicates that many of the intersections that will be impacted by construction activity are operating at a LOS of F.

**DATA REQUEST**

33. Please indicate what measures the project will take to insure that the LOS for this intersection will not be adversely impacted.

**BACKGROUND**

During construction of the project, truck deliveries of material and equipment will be required. The AFC indicates that during the sixth month these deliveries will peak at 29 deliveries per day.

**DATA REQUEST**

34. Please indicate the timing of the deliveries during the day and the current truck to car ratio for the truck routes.

**El Segundo Power Redevelopment**
**Data Requests**
**(00-AFC-14)**

**Technical Area: Various**
**Author:** City of El Segundo

**BACKGROUND**

The City of El Segundo made comments during the Data Adequacy review period. The city raised the following questions.

**DATA REQUESTS**

35. It is not clear from the project description if units 1 and 2 are currently operating or their operational load used in the AFC analysis.

36. It is not clear if a portion of the net station capacity increase of 280 megawatts is attributable to existing units 3 and 4, given the statements in the air quality analysis which seem to indicate emissions would also increase for units 3 and 4. How much of an increase in generating capacity for the station would be attributed to the replacement of units 1 and 2 versus any increase use of units 3 and 4?

37. Provide information about the relationship of the planned aqueous ammonia pipeline and a proposed Chevron project to renovate storage tanks for aqueous ammonia at the same location.

38. The AFC should include a full analysis of the impacts of demolition of the Southern California Edison (SCE) oil storage tanks, since the demolition of the tanks appears to be an integral part of the project to make that area available a laydown/staging area.

39. The AFC should provide details of the planned use of the SCE tank area after utilization as a laydown/staging area. . For instance, the applicant has previously informed the City of El Segundo that there are plans to construct an office building on the site.

40. A subdivision map for the splitting of the SCE Tank parcel into two parcels has been submitted to the city for review. The AFC should include a discussion of the proposed subdivision and its relationship to the power plant site.

41. The proposed maintenance and administrative buildings adjacent to the SCE tanks, depicted on figure 3.5-1b appear to be close to the existing property line as well as the proposed subdivision property line. The property lines should be clearly distinguished on the plans.

42. The floor area of the proposed maintenance and administrative buildings does not appear to be indicated in the AFC (page 3.9-1).

43. The AFC should include an analysis of alternative design to reduce the exhaust stack height so they would not be taller than the existing exhaust stacks.

44. The AFC should include additional discussion about the extent of construction impacts related to the construction of the two proposed water pipelines in the City of El Segundo.

45. The AFC should describe in more detail the proposed study of heat treatment as indicated on page 1-9.

46. Provide information about alternative ammonia sources if Chevron does not supply the ammonia from the adjacent refinery. The city's understanding is that Chevron has received a business plan for this service but has not formally committed to it yet. Without such a commitment, alternative sources must be analyzed.

47. The AFC should discuss the method for demolition of the existing exhaust stack in terms of safety.

## Air Quality

48. The Air Quality section of the AFC should clarify why weather data from the Lennox air monitoring station was used instead of data from the Hawthorne air station which is geographically closer to the project site (page 5.2-6).

49. It is not clear if the baseline emission for each unit represents the maximum annual operation under full load conditions or if the plant has been operating under partial load conditions. The AFC should indicate the existing operating load related to the maximum potential load.

50. The Air Quality section of the AFC should provide a discussion of why the future emissions of units 3 and 4 appear to be significantly higher than the baseline emissions (page 5.2-46). For instance, the current carbon monoxide (CO) emission level is 749 tons per year (Table 5.2-24) but the future level is expected to be 2,465 tons per year (Table 5.2-25). Does this mean the current units do not operate at full capacity? Would the increase in emissions violate any permit requirements or air quality standards? What mitigation measures are proposed for this increase?
51. Table 5.2-32 describes the proposed emissions from the new equipment. The discussion related to this table should explain why the calculations for the maximum daily emission (lbs/day) do not seem to equate to the maximum annual emissions (tons per year) when the daily emissions are multiplied by 365 days per year and divided by 2000 pounds per ton.

## Water Resources

52. The AFC should discuss any plans for the construction of a desalination plant in conjunction with the project, if such a plant is under consideration.

53. The AFC should include a discussion of any potential environmental impacts from the outfall from the Hyperion Waste Treatment Plant entering the seawater intakes

for the power plant with the outfall from the power plant contributing to biological contamination. This has been raised as a concern with the proposed AES Huntington Beach power plant upgrade and the proximity of Hyperion Waste Treatment Plan to the proposed El Segundo Power Plant project appears to be similar to the circumstances that existing in Huntington Beach.

54. The AFC should include the location of the recently constructed artificial surf reef, known as Pratte's Reef, on the appropriate maps The AFC should include a discussion of any potential impact on the surf conditions of the reef.

55. The City is concerned about potential stormwater run-off from potentially contaminated areas discharging to the ocean without treatment other than oil separators (page 3.4-12). The AFC should clarify the extent of potential contamination in the stormwater runoff.

## Visual Resources

56. In the Visual Resources section of the AFC, photo simulations should be provided for the new plant looking at the site from directly east of the site on Vista Del Mar and directly west of the site from the beach (figure 5.13-2b). The photo simulations in the AFC are taken from quite a distance away from the project site and seem to underestimate the mass of the structures when close up to them.

57. In the Visual Resources section of the AFC, the photo simulations should include the new 95-foot tall generation lead poles.

## Traffic & Circulation

58. The AFC should include more definitive locations for off-site parking and not defer analysis to post-construction plan submittal.

59. The AFC should provide a discussion of the status of commitments from property owner for providing off-site parking and staging areas, so the viability of these proposals can be determined.

60. The AFC should identify the location of the rail unloading facility discussed on page 3.9-14.

61. The description of LORS on page 3.12-5 should indicate the reference the entire El Segundo Municipal Code.

62. The AFC should provide a detailed analysis of construction traffic safety issues at the entrance to the project on Vista Del Mar.

63. The AFC should include additional discussion about the extent of construction impacts related to the construction of the two proposed water pipelines in the City of El Segundo.

64. The AFC should include an analysis of the traffic impacts from the construction activities associated with the demolition of the SCE oil storage tanks.

## Land Use

65. The land use section of the AFC should discuss the Coastal Development Permit requirements of the California Coastal Commission and its implementing authority, the City of El Segundo, and the applicability of such to the proposed project.

66. The land use section discusses different permitting process for the height of the proposed exhaust stacks. Administrative Use Permits or Conditional Use Permits are not appropriate permitting options for the proposed height increase. These processes can only be used for uses, not for deviations from development standards in the zoning code. A variance would be the appropriate processing option for requesting a deviation from a development standard.

67. The use of off-site laydown yards may require approval of a discretionary permit from the City of El Segundo (Page 5.9-45).

## Socioeconomic

68. The socioeconomic section of the AFC should discuss the applicability of the El Segundo Traffic Mitigation Fee program to the project (Page 5.10-26).

69. The socioeconomic section of the AFC should discuss the fact that there are no school fees that would be collected by the El Segundo Unified School District for the proposed project (page 5.10-27).

## Hazardous Material Handling

70. In the Hazardous Material Handling Section of the AFC, a figure should be provided to show the zone of influence of ammonia from a tanker truck release scenario (page 5.15-17) just as there is a figure for a pipeline release scenario.

71. In the Hazardous Material Handling Section of the AFC, it is not clear how high the ammonia concentration would be in a release under either pipeline or tanker truck release. It is stated that the levels would exceed significance (ERPG-2 level) but do not state if they would reach or exceed the IDLH or lethal level.

72. The AFC does not appear to include an analysis of the soil conditions beneath the Units 1 and 2, which would be replaced.

73. The AFC should provide an analysis of the soil conditions beneath the SCE oil storage tanks, which will be demolished as part of the project.

## Transmission Line Safety and Nuisance

74. In the Transmission Line Safety and Nuisance section of the AFC there should be a figure showing the location of the transmission line lattice towers that would be replaced with tubular steel poles (page 5.18-2). It is not clear if the construction impact of this aspect of the project has been discussed in the AFC.

75. In the Transmission Line Safety and Nuisance section of the AFC, it is not clear which transmission lines would be impacted by increased magnetic fields due to the increased load on the lines. A figure showing the impacted lines and the properties within 200 feet of the lines that could experience computer interference should be included (Page 5.18-29). It is not clear if there are residential properties that would be impacted by the potential interference.

76. In the Transmission Line Safety and Nuisance section of the AFC, a study of the local radio and television signal strength should be prepared to determine if there could be any interference from the transmission lines on local radio and television reception (page 5.18-44).

## Cumulative Impacts

77. In the Cumulative Impacts Section of the AFC, the list of cumulative projects in El Segundo should be revised to include additional projects (i.e., LAX Master Plan) that would be completed after the year 2002, since it seem likely that the proposed project would be not be approved by the California Energy Commission until late 2001 with a 20 month construction period (page 5.20-3). The plant would not be operational until 2003 or 2004. Attached is the current El Segundo approved project list.

**El Segundo Power Redevelopment**
**Data Requests**
**(00-AFC-14)**

**Technical Area: Water and Biological Resources**
**Author:** California Coastal Commission

**BACKGROUND**

Our concerns are increased given the existing conditions of Santa Monica Bay. As described in the AFC, "(t)he biological community in Santa Monica Bay has been identified as being imbalanced, severely stressed, or known to contain toxic substances in concentrations that are hazardous to human health." (p. 5.5-11). Additionally, Santa Monica Bay is described as impaired on the current 303(d) list due to levels of mercury, cadmium, copper, lead, nickel, silver, zinc, chlordane, DDT, and PCBs. The AFC does not adequately describe the cumulative impacts of current or proposed ESGS operations when evaluated alongside these other above-mentioned impacts.

We commend the applicant for stipulating to several mitigation measures (in AFC Section 5.6.4, BIO-9, -10, and –11) that partially address our concerns; however, the measures described in the AFC do not adequately mitigate for the known and probable impacts of past, current, and proposed operations.

**DATA REQUEST**

78. Additional information should be provided regarding the full effect of current and proposed facility operations on entrainment and impingement, and findings of other more recent studies on entrainment and impingement should be included in the CEC's review. We recommend that new studies be conducted to update the findings of the original 316(b) study and to represent new understanding in marine ecosystem interactions and sampling techniques and methodologies.

79. Also, the ongoing and potential effects of this project should be considered in combination with the effects of other existing intake and discharge pipes located in the Southern California Bight. This needs to be provided and evaluated as part of a more comprehensive cumulative impact analysis. The survey scheduled for 2002 as part of the Southern California Bight Regional Marine Monitoring Survey (see page 5.5-15 of the AFC) may be an appropriate vehicle to carry out this recommendation.

80. Additional information should also be provided that describes alternatives available to avoid or reduce entrainment or impingement impacts due to the ocean intake and discharge operations (e.g., dry cooling, combination wet/dry cooling, etc.).

**BACKGROUND**

**Adequacy of Best Technology Available (BTA):** The AFC describes the ocean intake and discharge system as being essentially unchanged since 1956 when a velocity cap was put on the intake. It also states that the determination of BTA for the facility was based on the above-referenced 316(b) study done in 1982 for the nearby Scattergood project. BTA for ocean intake and discharge systems has likely improved over the past twenty to fifty years, and in fact, other coastal power plants have upgraded their

systems to reflect newer technologies and findings about the effects of ocean intakes and discharges on marine resources.

**DATA REQUEST**

**81.** Additional information should be provided showing whether more recent and appropriate BTA has been developed during the past twenty to fifty years and whether this BTA is applicable to the ESGS facility. The applicant should then describe whether the existing intake and discharge are using BTA or if modifications to the existing structures are proposed to attain BTA.

**BACKGROUND**

**Effects of Thermal Discharges:** The application shows that thermal discharges from current facility operations are resulting in mortality of marine species, and that these impacts will continue under the proposed facility upgrade. The basis for much of the AFC's discussion on thermal impacts is from a 1975 study, which is described as including sampling from only two dates, February 7 and 8, 1973.

Our concern is similar to that mentioned above, in that this study may not reflect the current understanding of thermal impacts on marine resources. The information contained in the AFC does not provide an adequate basis to determine the full effect of thermal discharges from current and proposed operations.

**DATA REQUEST**

82. Additional information should be developed through new studies that more fully reflect changes to sampling methodology, ecosystem understanding, and other scientific developments over the past several decades. The CEC should incorporate this new information into its review of the current proposed project, or if the current proposal is approved, CEC approval should include a re-opener that would allow full consideration of new findings. Also as mentioned above, the survey scheduled for 2002 as part of the Southern California Bight Regional Marine Monitoring Survey (see page 5.5-15 of the AFC) may be an appropriate vehicle to carry out this recommendation.

**BACKGROUNG**

**Effects of Heat Treatment on Marine Resources:** The application states that impingement rates are related to heat treatments done to clear the intake structure of marine organisms. The AFC describes both current and proposed operations as resulting in impacts to numerous species of marine organisms.

**DATA REQUEST**

83. The applicant should provide more information on alternatives to heat treatment for clearing the ocean intake structure. Additional analysis should be provided on whether these various alternatives are applicable and feasible to both current and proposed ESGS operations.

**BACKGROUND**

**Effects on federal or state-listed species, and species of commercial importance:** We are also concerned with the probable impacts of proposed facility operations on federal- or state-listed endangered or threatened species and those species of commercial importance (e.g., rockfish). While the application provides some evaluation of effects on these species in the area of the facility, it does not fully evaluate the ongoing impacts of the facility. Impacts are described as not being significant when compared to the overall biomass of Santa Monica Bay, but that does not adequately convey the ongoing loss of hundreds to millions of individual organisms due to facility operations.

**DATA REQUEST**

**84.** Information should be provided regarding any effects of the current and proposed facility operations on federally-designated Essential Fish Habitat.

85. Additional information should be provided that more fully describes the impacts of current and proposed ESGS operations on species of concern, along with the cumulative impacts of ESGS operations and other impacts occurring in Santa Monica Bay, such as those included as reasons for 303(d)-listing.

**El Segundo Power Redevelopment**
**Data Requests**
**(00-AFC-14)**

**Technical Area: Various**
**Author:** City of Manhattan Beach

**DATA REQUEST**

86. Please provide a discussion and photo simulations of proposed improvements to the existing perimeter fencing, walls and landscaping adjacent to 45th Street in the City of Manhattan Beach.

87. Please discuss whether any construction traffic will use 45th Street or any other Manhattan Beach streets for access to the plant. Please provide number of trips, types of traffic and schedules.

88. Please provide a detailed map showing the new water supply line route as described in Section 3.8.1.5.

89. Please provide before and after construction views from the south, in the city of Manhattan Beach, similar to the views from the north (Figures 5.13-4a and 5.13-4b).